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DEVELOPMENT PLAN FOR

Patapsco River Valley Park



VARYLAND STATE PLANNING COMMISSION
OCTOBER 1950

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DEVELOPMENT PLAN FOR

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Patapsco River Valley Park



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Accuse not Nature!
She hath done her part;
Do thou but thine!
John Milton, Paradise Lost

MARYLAND STATE PLANNING COMMISSION

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Acting Chairman

CHARLES E. BROHAWI

October 1, 1950

I. Alvin Pasarew Director

TO: The Governor of Maryland

Legislative Council
Mayor and City Council of Baltimore City
Board of County Commissioners of Anne Arundel County
Board of County Commissioners of Baltimore County
Board of County Commissioners of Carroll County
Board of County Commissioners of Howard County

Gentlemen:

Pursuant to Joint Resolution No. I of the 1950 Session of the General Assembly, I take pleasure in transmitting herewith for your consideration and review the State Planning Commission's "Development Plan for Patapsco River Valley Park."

Implementing the Legislature's mandate, the Commission has made a complete and comprehensive survey of the Patapsco River Valley and has prepared a functional plan for the area's long-range recreation and conservation uses.

In urging that this survey be undertaken, the State Legislators pointed to the unfulfilled need for urban recreation in the most densely populated portion of Maryland. The Development Plan presented herewith offers a feasible and economic solution for meeting a major portion of the existing need.

To this end, it is hoped that the Department of State Forests and Parks and its parent body, the Board of Natural Resources, will be given early opportunity to examine the Commission's recommendations in detail, so that the new Patapsco River Valley Park may be inaugurated by an appropriation at the next session of the General Assembly.

Respectfully sumitted,

John B. Funk Acting Chairman

MARYLAND STATE PLANNING COMMISSION ADVISORY COMMITTEE FOR THE PATAPSCO RIVER VALLEY PARK PLAN

I. ALVIN PASAREW, Chairman
Director
Maryland State Planning Commission

Walter V. Bennett Board of County Commissioners Carroll County

William F. Childs, Jr. Chief Engineer State Roads Commission

HOWARD E. DEMUTH
Chairman
Committee for the Development
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MARYLAND STATE PLANNING COMMISSION



100 Equitable Building Baltimore 2, Maryland CHARLES E. BROHAW
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JOHN B. FUNK
Acting Chairman

September 20, 1950

I. Alvin Pasareu Director

Mr. John B. Funk, Acting Chairman Maryland State Planning Commission 100 Equitable Building Baltimore 2, Maryland

Dear Mr. Funk:

Submitted herewith for the Commission's review and action are our documented findings and recommendations regarding the development of the Patapsco River Valley as a recreation and conservation area.

The Plan was developed with the active aid and participation of City, County, and State officials, civic organizations, and private citizens, working in cooperation with the State Planning Commission and its consultants. In every phase of the survey, the Commission was ably assisted by the members of its Advisory Committee for the Patapsco River Valley Park Plan. This Committee has reviewed and approved the Development Plan as transmitted herewith. The Plan has also received the unqualified endorsement of the Advisory Committee of the Committee for the Development of the Patapsco River Valley, which organization was largely responsible for the initiation of the present survey.

The summary, included at the beginning of the report, outlines briefly the scope of the program contemplated. It is proposed that approximately \$558,429 be expended annually for the next twelve years, in order to provide for the complete development of the 8,500-acre Patapsco River Valley Park. When fully developed, the Park will include five camping centers, eight swimming pools and ponds, 75 miles of bridle paths, and 60 miles of hiking trails. The urban and semiurban recreation centers will provide facilities for games, swimming, picnicking, fishing, canoeing, boating, bicycling, golfing, archery, dancing, and outdoor bowling. The mud flats are to be transformed into a large lagoon surrounded by a park and playfield.

This is indeed not a timid plan. However, the facilities proposed are in keeping with the needs and recreational interests of the residents of the five political subdivisions comprising the Greater Baltimore Area, which houses more than half the population of the State of Maryland. If we are to make the most of the rich potentialities of the Patapsco Valley, the land must be secured at the earliest time possible. A four-year program of acquisition is recommended herein.

The State is at the threshold of a wonderful opportunity to develop and make availabale to its citizens a naturally beautiful, easily accessible park site. Let us hope that the tremendous civic interest and effort devoted to the formulation of the Development Plan will be justified by the adoption of the recommended program and its effectuation as scheduled.

Very truly yours,

I. ALVIN PASAREW, Director and Chairman, Advisory Committee for the Patapsco River Valley Park Plan

ACKNOWLEDGMENTS

The State Planning Commission acknowledges with deep appreciation the valuable contributions made by each member of its Advisory Committee for the Development of the Patapsco River Valley Park Plan. Special mention is also made of the considerable time and effort devoted by the following individuals toward the solution of special problems encountered in the course of the park study: Allan Lee, Engineer of Road Design, State Roads Commission; Albert L. Grubb, Engineer of Bridge Design, State Roads Commission: George R. Springham, Senior Assistant Highway Engineer, State Roads Commission; Anthony F. DiDomenico, Office Engineer. State Roads Commission; Karl E. Pfeiffer, Assistant Director, Department of State Forests and Parks; Ernest A. Vaughn, Director, Department of Game and Inland Fish; Dr. R. V. Truitt, Director, Department of Research and Education; R. D. VanDeusen, Biologist, Department of Research and Education: John J. Lang, Deputy Director, Department of Planning, Baltimore City; Harold S. Callowhill, Superintendent, Bureau of Recreation, Baltimore City; Louis G. Ningard, Principal Assistant Superintendent, Bureau of Water Supply, Baltimore City; Dr. Robert H. Riley, Director, State Department of Health; Dr. John C. Geyer, Department of Sanitary Engineering, The Johns Hopkins University: William G. Armstrong, Vice President, Arundel Corporation; Melvin E. Scheidt, Economist, Public Works and Natural Resources Branch, Fiscal Division, U. S. Bureau of the Budget; and Dennis O'Harrow, Assistant Director, Association of State Planning and Development Agencies.

The Commission is equally grateful for the fine cooperation extended by a number of outof-state public officials in providing background data on water usage and coordinated recreational
activities. These include: Herb A. Davis, Superintendent, Public Recreation Commission, Cincinnati; John M. Fitzgerald, Chief Engineer, Board of Water Supply, New York City; Oscar
E. Hewitt, Commissioner of Public Works, Chicago; George Hjelte, General Manager, Department of Recreation and Parks, Los Angeles; G. R. Thompson, City Engineer, Detroit; and Harold J. Toole, Director of Water Division and Chief Water Supply Engineer, Metropolitan District Commission, Boston.

Since it is not possible to list by name every civic organization, private citizen, and public official who participated in the formulation of the Plan, the Commission would like at least to thank them as a group, including the hundreds of members of the Committee for the Development of the Patapsco River Valley, for their significant role in spearheading the development of the Patapsco River Valley Park.

A final acknowledgment is due the Commission's nationally recognized consultants, F. Ell-wood Allen and Weaver W. Pangborn, of the F. Ell-wood Allen Organization, Park and Recreation Planners. New York, who have worked with tremendous energy and skill in surveying the park lands, studying the costs of acquisition, proposing imaginative and well-balanced recreational facilities, estimating the expenses involved in constructing, developing and maintaining the Patapsco River Valley Park, and in preparing the attractive exhibits for the report. The technical assistance of their associates, Antonin Raymond and L. L. Rado, Architects and Engineers, New York, is also acknowledged with thanks.

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FOREWORD

This report presents the potentialities of the Patapsco River Valley in the fields of conservation and recreation. It is a functional development plan which undertakes to carry out the recommendations of the Technical Committee of the Patapsco River Valley Commission of 1946.

In accordance with the Technical Committee's findings, the Plan presented here does not

call for the usual state park. While most of the park as proposed provides for the familiar hiking, horseback riding, sight-seeing, picnicking, swimming, and camping activities of state parks, the enlarged Patapsco includes several urban-type recreation centers to be intensively developed with varied facilities.

This great park provides attractions, some of them striking in character, in all the four counties bordering on the Patapsco River. Emphasis has been given to providing access to the natural assets of the existing park and the proposed additions. The Plan is correlated with the City's plans for the Lower Patapsco and Liberty Reservoir and with the Hugg-Thomas Wildlife Preserve of the State Game and Inland Fish Commission on the South Branch.

This is not a timid plan. It is ambitious but in keeping with the needs and interests of the area surrounding Greater Baltimore and of the State of Maryland.

SUMMARY OF DEVELOPMENT PLAN

The land proposed for acquisiton and development for the State park in the Patapsco River Valley comprises principally well-wooded slopes, but it also includes level bottom land, swamps, a limited acreage in farms, and some areas where excavation for sand and gravel will continue for a number of years. The Valley is rich in history, varied in mineral deposits, and replete with animal life. The River and its tributaries will serve as good fishing streams, once pollution is removed.

The total area recommended will add 6,97! acres to the present 1,564 acres in Patapsco State Park. This additional land lies within Anne Arundel. Baltimore, Carroll, and Howard counties and it touches all the urban centers from Baltimore City to Sykesville. The Park will be 26.45 miles long and have an average width of one-half mile. On the North Branch of the Patapsco it will connect with the new Liberty Reservoir property and on the South Branch it will terminate at the Hugg-Thomas Wildlife Demonstration Area, which is administered by the State Game and Inland Fish Commission.

Under the Development Plan, about 6,000 acres of the Park will be of forest character and will be given to conservation practices, hiking, fishing, horseback riding, picnicking in small groups, and nature study. The remaining 2,500 odd acres, much of it also heavily wooded, are recommended for large-scale picnicking, camping, and urban- and semiurban-type park units. A few sections of the area deserve early attention to prevent erosion.

The facilities proposed for the urban and semiurban centers include baseball, softball, and soccer fields, swimming pools, varied game courts, picnic centers, shelter buildings, day camps, fishing, canoeing and boating centers, food concessions, and such revenue-producing facilities as bicycle paths, golf-driving ranges, archery, dancing pavilions, and outdoor bowling alleys. The mud flats are to be transformed into a large lagoon surrounded by a park and playfield.

When fully developed, the Park will include five camping centers, eight swimming pools and ponds, 75 miles of bridle paths, and 60 miles of hiking trails. Long sections of seven stream valleys in the Lower Patapsco, including Deep Run and Stoney Run, and of eleven valleys in the Upper Patapsco, including Cedar Branch, Brice Run, and Piney Run, are incorporated in the proposed development. Boating and canoeing are recommended in the slack water above the several dams in the area.

The first and most urgent step is to secure the land. It should be acquired within the next four years insofar as this is possible, with top priority given to the property most likely to be utilized for immediate development. With liberal allowance for price changes, the estimated cost of the required land with the improvements on it is \$800,000, or \$115 an acre.

The program for development and construction spread over a twelve-year period will cost approximately \$5,900,000, or \$492,000 per year, not including engineering and architectural fees. The cost of improving the existing roads within the area and of constructing 22.5 miles of new roads is spread over the entire period of twelve years. Of the total development cost, 67 per cent is accounted for by 15 special units, mostly urban in character. Two of these, the Lagoon Park and "The Wheel," a swimming and games center, will not be feasible before six to twelve years, that is, until the land for the facilities becomes available.

The estimated annual patronage of the Park when fully developed will probably be more than 1,100,000, exclusive of motorists driving through. The annual cost of operating and maintaining the Park, after deducting income from revenue-producing units, is estimated at \$60,800. In the early stages of development, both operating costs and income will be relatively low.

For the effective development and administration of the Park, a highly qualified superintendent with decided promotional and executive ability will be required. He will need a competent staff of technicians, park police, and other personnel, as well as adequate funds and responsibility, in order to make the most of the rich potentialities of the Patapsco River Valley Park.

As to the adjacent Liberty Reservoir property, it is urged that the City of Baltimore provide access for motorists to both the base and the top of the dam and that fishing, picnicking, boating, and golf facilities be developed on the site.

The set



PATAPSCO RIVER, LOWER VALLEY, LOOKING UPSTREAM FROM ARUNDEL CORPORATION BRIDGE.



DEPLETED GRAVEL AREA, LOOKING DOWNSTREAM FROM HAMMONDS FERRY ROAD, BALTIMORE COUNTY.

I. INTRODUCTION: THE CHALLENGE OF THE PATAPSCO

The preservation and development of the Patapsco River Valley as a great park at the doorstep of Baltimore City is important for many reasons. The case for the park was presented in 1946 in the report of the Technical Committee of the Patapsco River Valley Commission. Therefore in this report, only the supplementary reasons are given for the project.

One of these reasons is economic. Proper development of the River Valley with its great acreages of forest land will mean the provision of periodic income from systematic cutting of timber in the forests, prevention of erosion, conservation of water and flood control, and maintenance of a home for the indigenous wildlife.

To a great extent, the land proposed for acquisition is forested with such trees as pitch, shortleaf and Virginia pine, white and red oak, yellow poplar, red gum, birch, and sycamore. The type of the stands varies from heavy saw-timber to seedlings.

The River Valley has been characterized as having a long and unusual geological history. Investigations have revealed 51 different kinds of minerals along the Patapsco. Asbestos, flint, feldspar, sand and gravel, crushed stone, and building stone are among the commercially valuable mineral resources, although some do not appear in great quantities.

A third great asset in the Patapsco is in its animal life. The combination of woodlands, streams, swamps, and fields contiguous to the forest makes for the development of a wide variety of wildlife. This includes squirrels, rabbits, foxes, raccoons, oppossums, chipmunks, woodchucks, mink, muskrat, weasels, flying squirrels, skunks, and deer, the last along the North Branch of the River. Similarly, there is a wide range of bird life which breed or have a seasonal habitat along the River. Quail, pheasants, herous, bitterns, mourning doves, cardinals, tanagers, red-eyed vireos, warblers, woodpeckers, towhees, brown thrashers, thrushes, catbirds, sparrows, hawks, and buzzards are among the numerous birds of the region.

The survey of the Patapsco River watershed made by the Maryland State Department of Research and Education in 1950 records bass, catfish, sucker, carp, and even trout streams. The quantity and variety of fish caught in recent years have increased, although the problem of pollution has yet to be resolved.

The historic values of the Patapsco are another asset that should be conserved and stressed. Some of this history is bound up with the development of the Baltimore & Ohio Railroad. Relay was a changing point for horses of the railroad in the era when the cars were horse-drawn. At one time, this community was an excursion and amusement center, having its dancing pavilion, bandstand, and "Flying Horses." It has been recalled that at the fall line of the River above Relay, fishermen by the hundreds were packed shoulder to shoulder in their quest for gudgeon, which was abundant at one time. There were Federal forts above Relay during the Civil War and infantrymen drilled on the field at St. Denis.

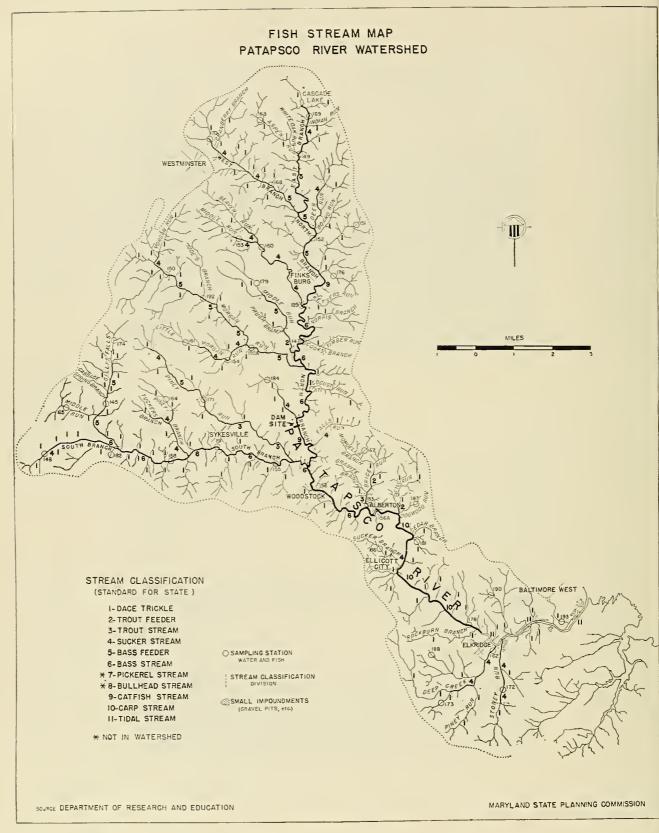
Both Relay and Elkridge reached their industrial peak before and during the Revolution.

The remarkable Thomas Viaduct of the Baltimore & Ohio Railroad, which few believed could sustain the weight of modern engines and trains, was completed in 1835. It was near here, in 1830, that Peter Cooper drove his Tom Thumb steam locomotive in a race with horse-drawn coaches and lost, but nevertheless proved the practicability of steam as motive power for trains.

These and other historic facts comprise a rich lore as a background for the new park.

Recreation for a Great Metropolitan Area

All that the foregoing assets and the scenery and opportunities for outdoor life imply comprise a rich opportunity for the recreation of a metropolitan area serving a million and a half people, in addition to visitors from throughout Maryland and other states. The Patapsco is located in a region characterized by the explosion of population outward from Baltimore and the steady growth of suburban life. This region, even allowing for the great parks, playgrounds, and recreation centers of Baltimore City, is relatively short in facilities for recreation, including swimming, fishing, camping, varied major and minor sports, golf and other interests, as was clearly brought out in the Technical Committee's report. The urban communities near Baltimore, with a single exception, lack modern, adequate public swimming pools. The next nearest state parks, other than the Patapsco, are Sandy



Point Bayside Park, 30 miles distant, and Gambrill, at Frederick, 45 miles distant. The enormous interest of the public in picnicking, both in family and larger groups, and near water, is only partially satisfied by the existing facilities.

It is thus timely for the State of Maryland to acquire

the necessary land and expand the present park into a great valley park for the use of present and future generations. In so doing, it will be acting in accord with a large number of other states, which have found that it pays well, both economically and culturally, to invest in a system of fine parks.



VIEW DOWNSTREAM FROM EDMONDSON BRIDGE.
DICKIE DAM IN FOREGROUND.



HOLLOFIELD SECTION OF PARK.

2. VARIETY IN TOPOGRAPHY AND CONDITIONS IN AREA

The differences in the character of the Valley proceeding from its mouth upstream are striking. The tidal flats, spread out over hundreds of acres through which the River flows as a narrow ribbon, give way above Relay to gorge-like heavily wooded slopes. Between these slopes the Patapsco falls gradually in cascades to the lower region. At one time there were ten dams in the stream. There are now five, three of which are used for water power. The presence of the dams makes for considerable slack water, offering excellent possibilities for canoeing and boating.

Because of the heavy siltation in the mud flats, industrial activity in the Lower Valley, heavy concentration of population, and the crossing of the River by railroads and numerous highways, the development of a park in the Lower Patapsco is made complicated and difficult. It will take time, for instance, for the Arundel Corporation to deplete all of its sand and gravel holdings which are included in the Development plan. The permanence of industries in certain areas that might otherwise become park has been considered in drawing the proposed park lines. However, it is highly desirable that local planning and zoning boards undertake a review of existing land use patterns in order to provide for an effective balance of future park, residential, and nonresidential development in the general area.

A continuous parkway closely following the river is not feasible even on one side of the stream. True, there are numerous stretches of several miles in which such drives are obtainable, but sooner or later one meets an industry or a town such as Elkridge or Ellicott City which must be by-passed. An unbroken course along the River to the site of Liberty Dam on the North Branch, or to Sykesville on the South Branch, may be possible for hikers and horseback riders. At worst, there will be very few places where they cannot move along near water.

The existence of numerous tributary streams flowing through heavily wooded valleys is one of the greatest assets of the Patapsco. This, fortunately, still remains true of the Lower Valley as well as of the Upper. Deep Run and Stoney Run are examples.

There is considerable swamp land, some of it to be dredged to form ponds, the rest to serve as the habitat of wildlife.

In brief, the types of land that are dominant in the proposed Park are first, wooded slopes, many of them steep; second, rolling uplands, wooded or in fields; and third, and least numerous, flat riverside meadows. These lands, together with swamps, water courses, and abundant flora and fauna, are the raw materials for the Patapsco River Valley Park.

3. DEVELOPMENT PLAN: GENERAL DESCRIPTION OF THE PARK

The Patapsco River Valley Park, as proposed, starts at the City line on Patapsco Avenue extended, follows the River about six miles to Relay, incorporates the existing City and State property comprising the Patapsco State Park, continues upstream to Woodstock, except for breaks at Ilchester, Oella, Ellicott City, Hollofield and Alberton (also called Daniels), by-passing St. Mary's and Woodstock colleges, and goes on up the River, including the North Branch, to the reservoir property line of the City of Baltimore. The park lines continue on both sides of the South Branch of the Patapsco to Sykesville, except for breaks at Marriottsville and Henryton.

The length of the Park to the confluence of the North and South branches of the River below Marriottsville will be 20.88 miles with an additional 3.7 miles on the South Branch, omitting the Henryton State Hospital property and an additional 1.87 miles to the Liberty Reservoir property, or a total of 26.45 miles.

The average width of the proposed additions to the Park is slightly more than one half a mile, with variations from a mile and one half to one sixth.

Where the taking area for the Park is much wider than half a mile, it is due to the special attractiveness of the property or the necessity of securing a large area to meet the requirements of the proposed function. Examples are the golf course area east of Patapsco Village and the combined open and forested land adjacent to the Baltimore-Washington Expressway near Lansdowne.

Proposed acquisitions in the valleys of tributary streams are ended at points where highways and power lines cross the valleys and terminate their continuity, or where the attractions have become relatively less for park purposes.

The total acreage recommended for acquisition is 6,971. With the 1,564 acres in the present Patapsco State Park, the enlarged park will comprise 8,535 acres.

Method of the Description

This review of the proposed development will omit details. Only passing reference will be made to centers

or facilities for which functional plans or detailed descriptions are given later in the report. Such centers are identified by an asterisk. The procedure will be to follow up one side of the river to the terminus of the park and return on the other, using the illustrated Development Plan as a guide. The proposed uses fall into three major types: intensively developed urban-type recreation centers; areas for informal and occasional use, such as camps, picnic sites, and scenic drives; and areas principally for conservation, such as forests and swamps. An explanation of the terms used in the Plan is included in Appendix A.

BALTIMORE COUNTY

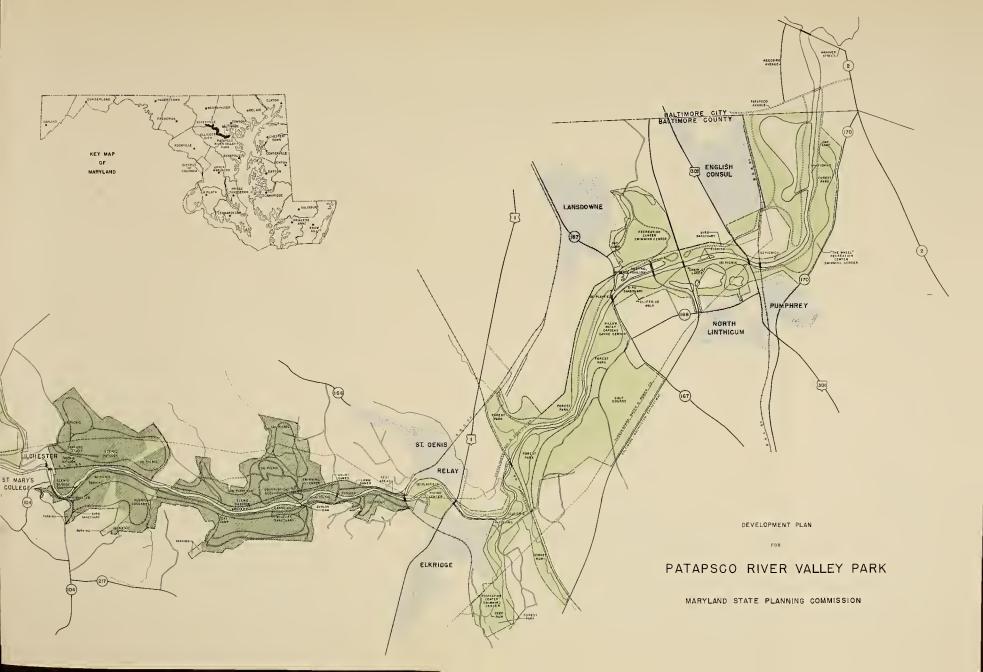
In the northeast corner of the huge flats area* which is to become a scenic park and playfield is a 23-acre area of firm ground which could be developed immediately for sports.

Approaching the bend of the river, the park area divides to bypass a large transformer station and a section of land, part residential, lying between the Baltimore and Annapolis Railroad and U. S. 301. A wooded section south of English Consul traversed by a stream, which eventually flows into the Patapsco, is incorporated in the Park as a picnic center. A section along the River, level and partly wooded, lying between the railway and U. S. 301, to a width of about 250 feet, will give access to fishermen, hikers, and picnickers and maintain the continuity of the Park along the stream.

West of U. S. 301, the park line follows the power line right-of-way westward as far as the Expressway. The land falls away steeply for most of the distance between U. S. 301 and the Expressway. The lower level is highly suitable for fishing, bridle paths, hiking, and picnicking, while the roadway along the high ground provides a scenic drive.

West of the Expressway a large recreation center* is planned. West of Hammonds Ferry Road, the northern boundary of the Park continues to follow the power line right-of-way until a point is reached beyond the Baltimore & Ohio Railroad yards. Here, the boundary follows the line of woods to the Baltimore & Ohio tracks. This section of the Park, bounded on the west by the Pennsylvania Railroad is a heavily wooded stream valley, in places marshy, but suitable for picnicking, hiking, and horseback riding.





Playfield

Much of the long stretch of land between the power line, the Hammonds Ferry Road, and the River is now being worked for sand and gravel. It is the intention that this area, when available, become a forest park. However, a section of about 40 acres west of Hammonds Ferry Road and fronting on the River is designated as a playfield. Fishing and picnicking wifl, of course, be feasible all along the stream. From this point, a motorist can retrace his course or drive through railroad property to an underpass under the Baltimore & Ohio and quickly reach U. S. 1.

On the Baltimore County side, the park area of the Lower Patapsco ends at Relay in a large level field of about 17 acres adjacent to the River. This field is designed as a playfield.

EXISTING STATE PARK AREA

The principal developments are picnic and camping grounds, a swimming pond, riding and hiking trails, and a nature center. Lateral access is limited.

The recommendations are aimed at giving greater access to the attractions, modernizing the swimming center, adding to the other facilities for active recreation, and providing additional facilities for the enjoyment and comfort of the public.

Although a considerable portion of this area is under the jurisdiction of the Bureau of Water Supply of Baltimore City, the assumption is made in this report that such property will eventually be merged with that owned outright by the State and may be regarded as a part of the Park for planning purposes.

The undeveloped areas between the park road and the River lying between Relay and Avalon should be cleared for rest areas, croquet, badminton, other lawn games, and informal recreation. The section at Avalon which was formerly occupied by the buildings of the Civilian Conservation Corps should be developed for volley ball, paddle tennis, and other court games.

Swimming and Picnic Facilities

The swimming area should be modernized and provided with bath houses and enlarged parking space.* West of the swimming area is a former pasture recommended now for archery and supplementary parking. On high land to the northwest, in what is known as the Vineyard area, an acquisition of an area 250 feet by 550 feet is recommended to provide, along with existing fairly level land, for large-scale

picnicking for industries, churches, and clubs. Among other facilities, a hard-surfaced area for outdoor dances is proposed at this center.

Nature Study

Approaching Ilchester is a heavily wooded section very rich in animal life, including foxes, raccoons, opossums, squirrels, chipmunks, terrapins, and a variety of birds. This is a very suitable area for nature study.

Thistle Road

Thistle Road extending from Frederick Road to the River is very attractive. Acquisition of its entire length, including the stream bed and to the top of the slopes on both sides, is recommended, except where homes interfere. In the latter case the depth of the acquisition should be not less than 50 feet from the present road.

Forest Park Area

Below Ellicott City it is feasible to acquire the hillside and a stretch along the River to a distance of 3,150 feet upstream from Thistle Road.

Large-Scale Camping

North of Oella is a great acreage of wooded land, practically unbroken by human use which is recommended for camping and associated informal recreation. A community recreation area to include day-camping facilities, picnicking, softball, and an area for children is indicated in the section of the Park adjacent to Oella. An area of approximately 300 acres is designated for organized camping for youth groups.

The 400 or more acres north of U. S. 40 are recommended for development as a family camping area and also for the use of industries and clubs.*

Alberton to Woodstock

At Alberton, a playfield is planned which incorporates an existing ball diamond west of the town and in the bend of the River.

For the better protection of the stream, it is recommended that the land be acquired along it on both sides of the roadway within the town, excluding the houses. Two near-by stream valleys are included. The remainder of the land from Alberton to Woodstock is designated as forest park. An exception to this is an area above Alberton commanding a very fine

view where more intensive use is intended. This will include picnicking, horseshoes, and modified softball.

Woodstock Area

Woodstock College, which has a considerable park and recreational development of its own, holds some 5,900 feet of frontage along the Patapsco River. It is proposed that the privilege of access for walking along the river and for horseback riding be requested from the College.

CARROLL COUNTY

Marriottsville-Dam Area

This great area, including features on both the North and South branches, as far as the site of the dam for the new reservoir and up to Marriottsville, constitutes one of the most unusual opportunities in the Park.

The Plan includes a 250-foot setback on both sides of a new county road extending from Marriottsville to the Baltimore County bridge on the north side of the Patapsco.

A scenic road is also planned along the Piney Run.

As proposed, the Park will surround the Henryton State Hospital. The north boundary, however, will be only 100 feet from the grounds of the institution.

The Hospital's property is a logical center for a major recreation development because of the extensive level fields on both sides of the River, the stream itself, the woods, and the topography. Most of the facilities indicated for such a development would fall within the institution's boundary and particularly on the Howard County side of the river. Proposals for the Howard County part of the property are included in the section which follows.

For the Carroll County side, a picnic center, a playfield, and a scenic outlook are proposed.

The area west of the Henryton Hospital is designated as forest and picnic area principally. On the Carroll County side, the park area terminates approximately 2,000 feet east of Sykesville.

HOWARD COUNTY

Hugg-Thomas Wildlife Demonstration Area

This preserve is under the auspices of the State Game and Inland Fish Commission. Among other features there will be a twelve-acre park within the demonstration area in which a fish pond, a picnic area, and other facilities will be developed. While not a part of the Patapsco River Valley Park, this area will be an added attraction to park visitors.

River Road

The roadway along the greater part of the South Branch from Sykesville to Henryton, with some improvements, will provide a scenic ride as well as access to the various units of the park.

Old Howe Estate

The first proposed major unit east of Sykesville is the old Howe Estate* which extends from the river road to a point near Route 32, with private roads leading into both of these roadways. The large picturesque house should be restored to serve as a possible headquarters for the South Branch portion of the Park, a historical museum, and an area for picnicking and court games. It is located near a very beautiful stream.

Camping Area

Moving eastward, the next major area is a property of approximately 100 acres of forest lands suitable for organized, overnight and day camping. A section of pines and a scenic outlook are features of this area. A dam to facilitate canoeing and boating is shown at the end of a six-acre field, about 1,000 feet upstream from the river bridge.

Forest Park

The next proposals eastward, to a point about onehalf mile west of Henryton, are for a general forest park including a bridge across the River to a playfield on the Carroll County side.

Henryton Center

The greater part of the development for the Henryton Center* will lie on the Howard County side.

Wildlife Sanctuary

Three quarters of a mile downstream and south of the railway is a large swamp area in which egrets, herons, and other wild fowl are to be seen. This area, with a section of adjacent woods and some open fields, is planned as a wildlife sanctuary* open to the public.

Forest Park

The section downstream as far as Woodstock is designated as forest park. Part of it should be reforested.



SOUTH BRANCH, BELOW SYKESVILLE.



OLD HOWE ESTATE, SOUTH BRANCH.

There is an underpass under the railway to a large field along the River.

Informal playfield

The proposed acquisition east of Woodstock for approximately one mile is limited to an average width of 1,000 feet from the River. The portion near Woodstock is designated as an informal playfield.

Camel's Den Cave

The stream valley shown next on the Development Plan is incorporated in the Park to a distance south of the Patapsco approximately one half mile. One of the attractions of this area is Camel's Den Cave in which archeologists have discovered artifacts of historic value.

Forest Park

This consists principally of an area nearly a mile in length from the River and about 1,000 feet wide, lying on both sides of a tributary.

Skeet

The adjoining area has scenic importance and is designated as a possible location for skeet since it is remote from intensively developed sections of the Park and local urban centers. It is in a high location, unobstructed by trees. Although firearms are presently not permitted in State parks, the possibility of setting aside this area for skeet should be considered.

Forest Park

From this location donwstream to the existing park land below Hollofield, the new area will be principally forest. A special point of interest is the dam above Alberton. A riding center is proposed at the bend of the River near the Hollofield Bridge. Acquisition of land for parking at the fire tower reservation is recommended. The existing open area where the present park road terminates at U. S. 40 is designated for parking.

Park Entrances

The Development Plan indicates entrances to the Park from both sides of U. S. 40 on existing park land. It is important that the Park be made readily accessible to highway users.

Scenic Outlook

An existing park roadway leads to a location at a high point above U. S. 40, the railroad, and the river, from which excellent views in three directions may be obtained. This is a natural objective for visitors. The roadway approaching it should be conditioned for automobile travel. Picnic facilities and parking to accommodate 60 cars should be provided.

Day Camp and Nature Center

South of the foregoing location within the present park, the woods lend themselves to day camping and nature study, particularly since the location is near a heavy concentration of urban population in Ellicott City and Oella. A shelter building, council ring, and a small zoo for native animals are recommended facilities. Animals might be released from the zoo in the fall.

Scenic Stream Valley

Just north of Ellicott City, the present park includes a small section of the valley of a very beautiful stream which empties into the Patapsco. It is proposed to acquire approximately 270 feet on both sides of the stream for a distance of about 1,580 feet, connecting the Park at this point to the existing road shown on the Development Plan. Through this stream valley, paths for horseback riders and hikers may be laid and picnic facilities in small number may be provided.

ELLICOTT CITY TO RELAY

This section refers almost entirely to an area already in the Park. As previously noted, the Park bypasses Ellicott City.

Major Recreation Center

Immediately east of Ellicott City, a large recreation center is proposed.* A feature of this unit is the excellent view from "Strawberry Hill."

Protected Stream Valley

It is proposed to acquire the land on both sides of the stream shown on the Development Plan east of the major recreation area to provide an attractive area for horseback riding, hiking, and access to a proposed underpass under the Baltimore & Ohio Railroad. This underpass will make it possible for opening wide areas between the railway and the river bed for the use of hikers, fishermen, and horseback riders.

The Park at this point terminates adjacent to the property of St. Mary's College.

Existing Bird Sanctuary

The existing park area resumes east of Ilchester. It is proposed to provide a parking area within the bird sanctuary off Route 104 for approximately 20 cars and eventually to construct paths and bridle trails through the area.

Bloede Dam

This former power dam contains a core about 30 feet wide and 12 feet high, from which large circular windows look out under the heavy volume of water pouring overhead. Features are recommended that will popularize this outstanding attraction.*

Acquisitions

Acquisition of several properties, most of them under consideration for some time, are proposed within or adjacent to the existing park lines. One is the triangular Pindel property of twelve acres which projects deeply into the existing park. Another is a tenacre tract, to provide parking and picnic facilities near the scenic Cascades. Another is the Crist property of four acres, which includes a food concession and small stable located on the park road and adjacent to a major picnic area. Still another is a five-acre tract of open farm land to provide a parking area serving the nature center. The Brown property on which a small refreshment concession is located adjacent to the Avalon picnic center should also be acquired.

Improvements at Avalon Picnic Area

A large picnic shelter suitable for social activities at this center is recommended. All roadways within and near the picnic area should be either hard surfaced or periodically treated to lay the dust.

Scenic Drive

The Rockburn Road on present City land should be improved as a scenic drive.

Additional Picnic Areas

The extensive area lying between the park road and the River east of the park bridge should gradually be developed for picnicking, since present picnic areas along the River are often overcrowded.

LOWER PATAPSCO

East of the big curve in the Baltimore & Ohio Railroad at Relay is a flat field of about 20 acres which is proposed as a major riding center.*

Deep Run Valley

The park bypasses Elkridge proper and follows a very narrow course along the River until Deep Run Valley is reached. The park boundary then follows the power line, in part, crossing the roadway and continuing to the right-of-way of the Baltimore & Ohio Railroad in order to include two farm fields.

Recreation Center

Along the bank of Deep Run and including the two farm fields, it is proposed to develop a recreation center.*

ANNE ARUNDEL COUNTY

Deep Run Area

The Anne Arundel portion of the Deep Run Area will be a forest park providing fishing, boating, hiking, picnicking, day camping, and riding. The area includes a limited amount of swamp, many fine trees, and much land suitable for the planned activities.

Stoney Run Area

It is proposed to acquire this stream valley to a width of about 500 feet south as far as the right-of-way of the Baltimore-Washington Expressway. It is possible that a State road may be constructed through this area. Even if this is carried through, it will not invalidate the proposal. Picnicking, hiking, horseback riding, and motoring through this scenic area would be the principal recreation activities.

Picnicking and Fishing Spot

This location is at a point near where Deep Run empties into the Patapsco. It is a choice fishing and picnicking site for small groups. The area includes a field west of Deep Run.

The "Dunes" Forest Park

Extending for a great distance east of the Pennsylvania Railroad are the partly active, partly depleted sand and gravel holdings of the Arundel Corporation. The depleted area comprises many acres of mounds resembling dunes and ponds. This section, plus the remainder when the operations are completed, is designated as forest park.

Willow Water Gardens

The partially swampy section of the Arundel property immediately west of Hammonds Ferry Road and near the River is proposed as a canoe center.* The area was once the location of a considerable industry devoted to the extensive cultivation of willow trees for making furniture.

Golf Course

The only golf course* in the Park is planned for the area comprising 152 acres west of Hammonds Ferry Road, between Nursery Road and the Baltimore-Washington Expressway.

Bird Sanctuary and Scenic Walk

An existing path along the slope of the high river bank at Raynor Heights commands a good view of a swamp area frequented by wild fowl. The bank, with its many excellent trees, and the swamp are incorporated in the Park as a permanent refuge and nature center.

Chain of Lakes

Gravel operations east of the new expressway have left large ponds already in use for fishing. By connecting the ponds and the river with channels, a system of ponds may be created for use in fishing, boating, and picnicking.

"The Wheel" Recreation Center

In the Arundel property east of Pumphrey, when available, the major feature proposed is a group of recreation facilities uniquely arranged in the form of a wheel.* Eighty to 100 acres will be utilized for the purpose.

Day Camp and Picnic Center

In the wooded land west of Brooklyn Heights, forest park development is proposed. This unit is to be linked with Anne Arundel County Board of Education property.

ACCESS AND CIRCULATION

The major consideration governing the proposals for access roads and movement within the Park is that the development is not a parkway but an elongated park broken by towns, a few industries, and frequent valleys with steep slopes.

For automobile traffic along the River, dependence in the Plan is placed principally on existing county and park roads. The exceptions are on the Baltimore County side of the River in the Lower Valley and on the Howard County side between U. S. 40 and Woodstock. As shown in the Development Plan, a park road is proposed from the flats area to the right-ofway of the Pennsylvania Railroad on the Baltimore County side, going along the south boundaries of English Consul and Monumental and coming up to the Baltimore-Washington Expressway. In the Upper Valley, the new road begins at the end of the present park road at U. S. 40 and continues to the bridge below Hollofield. It resumes at Alberton and continues to the park area east of Marriottsville.

In a park of this length, touching many localities in several counties, the factor of lateral access is very important. Considerable attention has been given to this factor in establishing park boundaries in relation to existing roads, including private roads. However, the nature of the Park, particularly in the Upper Valley, is such that too ready access would be inconsistent with the informal use of the area.

The Baltimore & Ohio Railroad, which extends along most of the Patapsco River Valley, prevents safe access except to persons following immediately along the stream at several points. As the Plan shows, it is proposed at the one location, between Ilchester and Ellicott City on the Howard County side, that an underpass be constructed in order to make more readily available meadows along the River. An existing underpass north of Woodstock allows passage even for automobiles. However, in several locations park users must be content with walking or riding horseback along the stream after obtaining access from some point where an existing road crosses the railway.

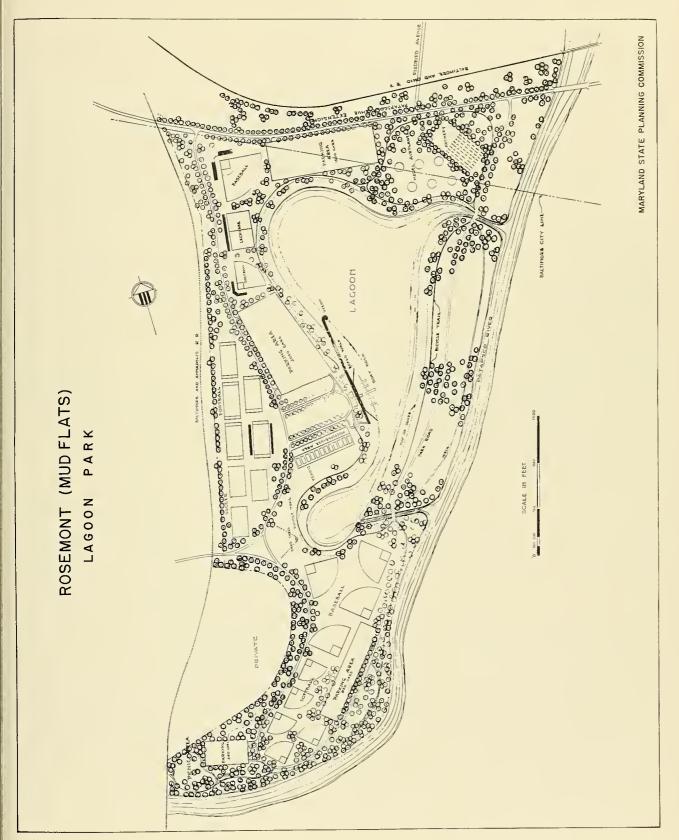
The problem of giving access to the Park from U. S. 1 at St. Denis is met by providing a right-of-way from the park area near the River to the rear of commercial and residential properties along U. S. 1 to connect with the highway at a stop light west of the existing Distillery.

Two park entrances, one on either side of U. S. 40 in Howard County, are planned near the Edmondson Avenue Bridge.

Within the park area, proper circulation is provided by minor park roads, bridle paths, hiking trails, and walks. The Development Plan does not attempt to show all the bridle paths and trails.

COORDINATION OF STATE AND BALTIMORE CITY LAND

In the Lower Valley, the State park land should connect with City property on both sides of the River. On the eastern side, the connection with City property can be made by way of Riverside Road, and the Patapsco Avenue Extension; on the western side by way of Reedbird Avenue. The development and extension of City parks and parkways in these locations are recommended. They will serve a dual function, namely, provide for the growing recreational needs of the City residents and furnish an attractive southern approach to Baltimore.



4. SPECIAL UNITS: FUNCTIONAL PLANS AND DESCRIPTIONS

The units of the Park proposed for intensive or special development are depicted in functional or schematic plans and descriptions in this section of the report. These units are near urban centers.

LAGOON PARK

The mud flats on the north side of the River offer an unusual opportunity for recreation development. Like the former Flushing Meadows and Charles River Embankment, these unsightly mud flats can become a beautiful park. Their position is strategic as they are actually the south gateway to the City of Baltimore. The development of these flats into a gateway park not only would mean much to improve the approach to the City and create an impressive entrance to the Patapsco River Valley Park but they can be developed with facilities for wide human use.

The nature of the mud presents an engineering problem. It is proposed that a large portion of the flats be filled with natural dumpage over a period of years but that the center be excavated for a lagoon. This lagoon will be the center of attraction and will provide opportunity for all types of small-craft boating. The extension of Patapsco Avenue will furnish access to circumferential park roads. Facilities should be developed for several types of major field games, picnicking, and various types of unorganized activities.

One of the features of this unit will be a paved bicycle trail; another will be a band shell for symphonic concerts. Three major buildings are proposed: a central building, a dance pavilion, and a building for storage and concessions.

LANSDOWNE RECREATION CENTER

The area of this intensively developed recreation center is approximately 190 acres. The main entrance is from Hammonds Ferry Road. There is also access by way of two streets in Lansdowne and by way of the park road paralleling the River. The development will serve the varied interests of people of a wide range of ages. The ponds of the depleted Arundel Corporation sand and gravel area near Hammonds Ferry Road are to be utilized for fishing, canoeing, boating, and casting. The main park entrance leads to a parking area from which a dance pavilion built

out over the large pond and a boat rental dock are available. The pavilion commands a view of the River.

A park road leads up to the major activity unit of the recreation center. Here are planned the administrative center, a bathing area with bathhouse and play space, a hard surface multiple-use area with courts of several types, a softball field, a children's area, miniature golf, a golf driving range, and a putting area. Near by are horseshoe courts and an archery range.

The children's area includes play apparatus and three always popular features, a carrousel, pony rides, and a miniature railroad.

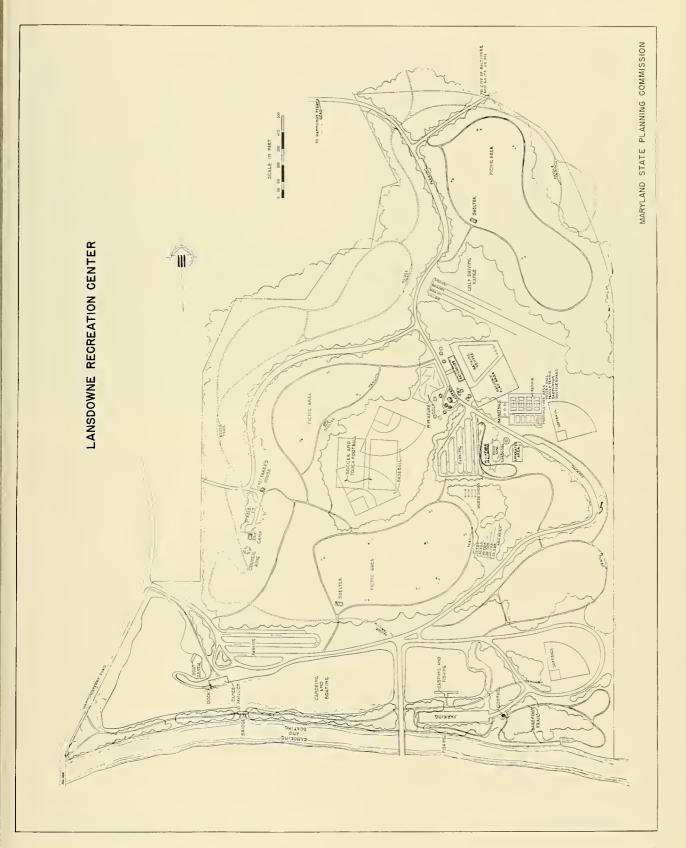
Two baseball fields, with soccer and football fields superimposed, will be centrally located in existing open fields.

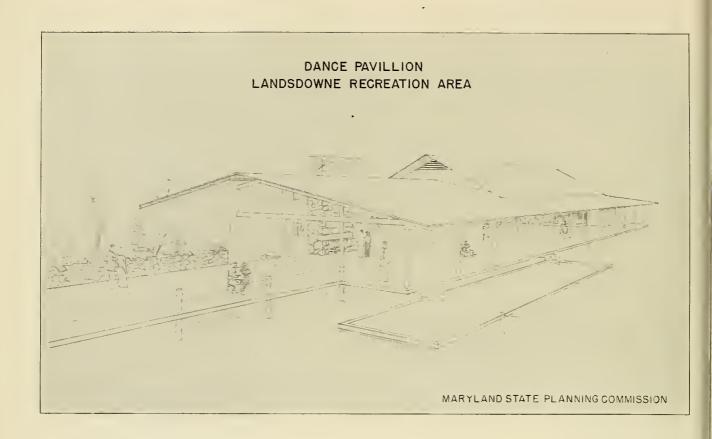
The heavily wooded areas of this property are set aside for three large picnic centers and a day camp. The camp area is approached by a good road from Hammonds Ferry Road and is connected with other portions of the Park by paths and bridle trails.

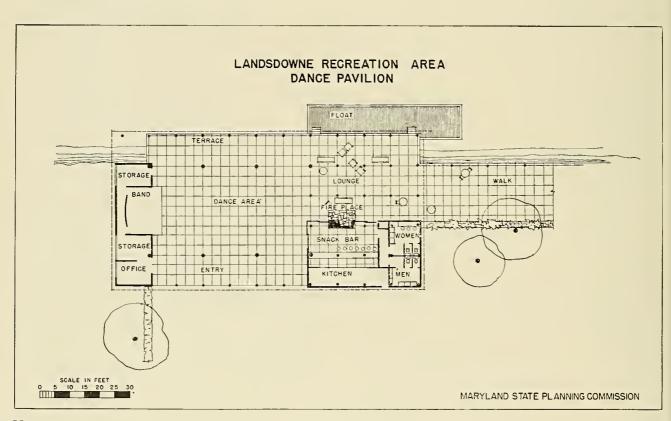
Canoeing, boating, and fishing are planned at the riverside which skirts the property on the south.

An unusual feature, "A Barefoot Trail," is located adjacent to the River. The purpose of this quartermile trail is to provide a variation of surfaces suitable for those who like to walk barefooted. At the entrance to the trail there is a small building where shoes and stockings can be checked at option. The trail starts off in a grassy area, changing later to sand, and then to a shallow area of water with sandy bottom. Adjacent to this is a muddy section where one can feel the mud ooze up through the toes. Again there is a sandy area, more grass and so forth. The trail ends as it winds back to the starting point, where there are water, towel, and soap available. While it is desirable to cover the costs of the special services offered, the trail should be open to all persons without charge.

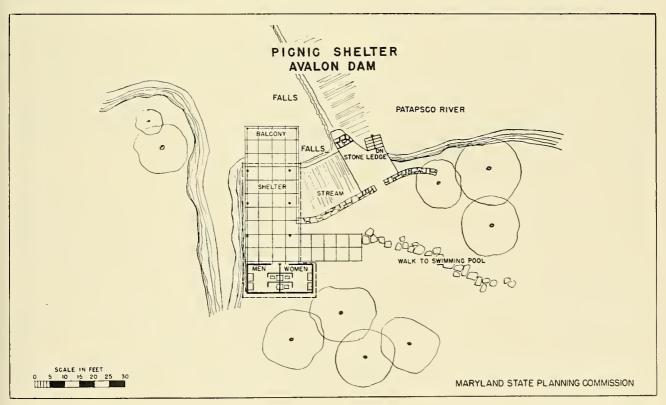
The bathing center is a modern, recirculating pool but not of conventional design. It is a large triangular area for bathing and swimming. The deep end where the diving boards are located is at the narrow end of the pool opposite the bathhouse.

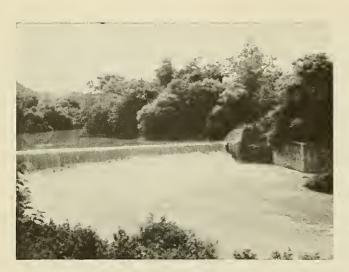












AVALON DAM. OLD WATER WORKS FOUN-DATION AT RIGHT

AVALON DAM AND SWIMMING POOL

The condition of the reservoir makes swimming undesirable at the present time. It is recommended that the reservoir be drained and the mud and debris removed. A gravel or stabilized base should be provided which would result in an excellent clear pool for swimming. A hyper-chlorinator placed at the present stream intake will insure purity of the water.

A modern bathhouse, with dressing rooms, showers, toilets for both men and women, and a central basket checking system, will provide adequate facilities for bathing. To this must be added sufficient space for parking, picnic facilities, and a beach for sun bathing.

The old foundation adjacent to the dam offers a splendid opportunity for construction of an observation deck and picnic shelter. The deck as proposed is cantilevered out over the River in order to obtain a better view of the falls.

YOUTH ORGANIZATIONS' CAMPING AREA

South of U. S. 40 is another large camping area of nearly 300 acres designated for the use of youth organizations, such as Boy Scouts and Girl Scouts. The Park should provide camp sites, a recreation building, and a mess hall to be rented to youth agencies. Other necessary facilities, however, should be provided by the organizations who make use of the camping area. A modern swimming pool is also a part of the proposal.

FAMILY AND ORGANIZATION CAMPING AREA

For this area, approximately 400 acres, the following facilities are proposed: two dormitories of simple construction, each of them designed for 100 persons for the use of churches, clubs, or industries; a mess hall; a recreation hall; and a swimming pool to be fed from waters from Cedar Creek. In one section of the park separated from the foregoing facilities, an ultimate total of 30 housekeeping cabins for the use of families is planned. In a secluded area a clearing in an attractive spot is designated as the "church in the woods." This is for outdoor religious services. A park road of approximately a mile and one quarter is shown extending through this camping center. The camp facilities will be revenue producing.

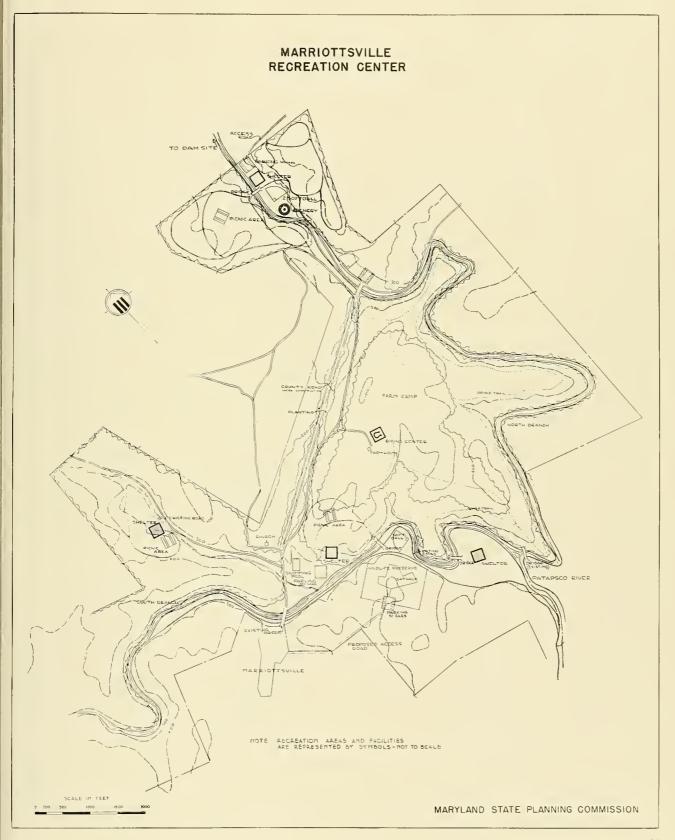
MARRIOTTSVILLE RECREATION CENTER

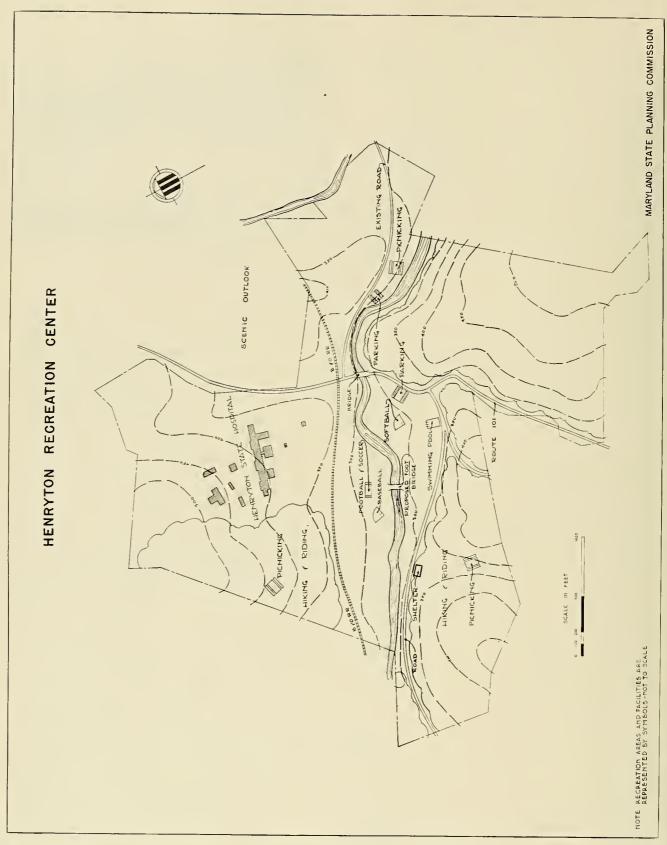
This designation is given to a very large area lying between the North and South branches of the Patapsco, above their confluence. It extends up the North Branch to the line of the Liberty Reservoir property and includes a portion of the valley of Piney Run and a section south of the Baltimore & Ohio Railroad.

In the area south of the dam site, picnic centers are planned on both sides of the river, including a shelter building, two softball fields, an archery range, and a parking area. The access road, leading to the parking space, is a farm road. This development is reached from the south by a very attractive riverside path extending down to the Baltimore County bridge. Near the bridge, a softball field and a parking area are shown.

The high lying farm bounded by the meandering river is designated as a farm camp, where outdoor education may be developed in cooperation with boards of education and welfare agencies. With remodeling, the farm house and barn may be used in this program. A riding center is also projected.

Nearer Marriottsville, a group of structures in a very large field is planned. Included are a swimming pool for regional service, a shelter building for picnickers, and a parking area for 400 cars. This swimming and picnic center can accommodate very large industrial, church and other groups. Paths lead to a proposed footbridge near the beautiful falls in the South





Branch and to another bridge crossing the River south of the falls to a promontory-like elevation on which

erection of a small shelter is desirable.

A new county road links these two sections of the unit.

The design also includes a wildlife preserve and a picnic center which is off Piney Run road. The picnic center is made accessible by a footbridge, and the preserve, by a road ending in a parking area from which visitors may walk through woods to a "catwalk" built out into the swamp. From this vantage point, the wild fowl of the area may be observed.

RECREATION CENTER, HENRYTON

The proposals are with one exception recommended within the present property of the Henryton State Hospital. The major development is south of the Baltimore & Ohio Railroad. East of the Patapsco River Bridge, Route 101, a picnic area is planned adjacent to the River and next to it a parking area. West of Route 101 and north of the River, football, baseball, and soccer fields are located on the large existing level field, which may require some drainage treatment. A wooded land west of the hospital buildings provides for hiking, riding and picnicking. To the east on high ground a scenic outlook is proposed.

HOWE ESTATE, SOUTH BRANCH

The former glory of the old Howe Estate should be restored both in building and grounds. This large estate near the terminus of the park can serve among other things as a site for 20 family cabins in a magnificent setting.

The Howe residence should be renovated and turned into a lodge and historic museum. One wing can serve as quarters for a caretaker. The dining room with its French doors leading to the paved terrace can be used for serving meals to those who wish to eat in a lovely environment. Approximately twelve rooms can be made available for overnight guests.

The main living room can be used as a museum and become an added attraction to the area. Picnic facilities, trails, and quiet rest spots should be developed.

ELLICOTT CITY RECREATION CENTER

This 100-acre recreation area is adjacent to Ellicott City and is proposed to serve the urban population of the community and Oella as well as visitors from throughout the metropolitan area and State. It is accessible by an existing road leading off Route 102 and by a farm road which also leads into this highway.

An unusual feature of the area is a scenic outlook at a high elevation commanding attractive views along the Patapsco. An informal parking area is planned at this outlook for the accommodation of visitors.

The main entrance to the recreation center is at a point near Ellicott City. A children's playground area will be located near the main entrance and adjacent to the administrative control center.

The facilities for sports include one baseball, two softball, and one soccer field and an archery range. A large parking area is provided near the entrance. Following roughly an existing farm road, a park road is planned leading toward the east and north to a day camp and picnic area. Camp sites for limited overnight camping will be made available.

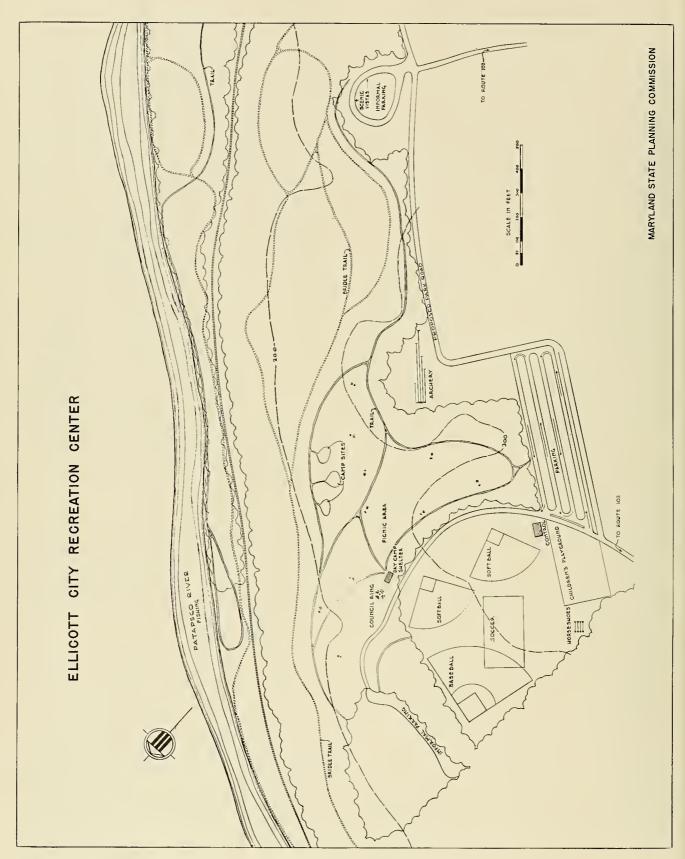
Circulation in the area is provided by a park road leading from the major parking area to the scenic outlook and to the picnic area, paths, and bridle trails.

There is no immediate access from this center to the meadows lying between the Baltimore & Ohio Railroad and the River. The hillsides are steep and there is no means of crossing the rails in safety. Hiking and bridle trails are indicated in the section between the railway and the River, but access to them must be gained from the north or the south.

BLOEDE DAM

The Bloede Dam offers an opportunity for a unique and rather spectacular recreation feature. The core of the Dam is approximately 30 feet wide and extends the width of the River. The shell of the dam is supported by a series of concrete arches. Between each arch on the waterfall side is a large circular port hole. The effect is striking.

It is proposed to provide steps into the tunnel on each side of the River in order to allow people to walk beneath the falls from one side of the River to the other. It is further recommended that a small grill be installed at one end where light refreshments can be served in a most unusual environment. This subterranean grill will attract a great many people and become a distinct and unusual feature of the Park. It will be necessary to pave the floor of the Dam and make minor repairs to the shell. The present superstructure should be removed to create a more pleasing effect and prevent the accumulation



of debris, and the silt above the dam should be removed.

DEEP RUN RECREATION CENTER, ELKRIDGE

This is another center of semiurban character. Extensive wooded areas for fishing and picnicking lie adjacent to Deep Run. Shelter buildings for picnics and day camping are planned. A council ring is included. A swimming pool, 35 x 70 feet, a bathers' area, and a hard surfaced multiple-use area with three shuffleboard, two badminton, two paddle tennis, and a volley ball court, a basketball court, four horseshoe courts, an archery range, a softball field, and a soccer field, are other facilities included in the plan.

RIDING CENTER, ST. DENIS

This area is located in a 27-acre field adjacent to the River and near U. S. 1. To enter the Park in the Lower Valley, riders do not need to cross U. S. 1, but may follow a path along the River's edge under the bridge for U. S. 1.

The Plan provides ample space for exercising horses and for instruction.

Shown on the plan for the stable on the first floor are 38 tie stalls, four box stalls, and two feed rooms. On the second floor are the hayloft and instructor's apartment. A club building contains a lounge, a snack bar, office, and terrace.

While the space, access road, and trails are to be provided by the Park Management, it is proposed that the structures and facilities be provided by a riding club or civic organization.

GOLF COURSE

An 18-hole golf course is proposed for an area of 152 acres, comprising depleted sand and gravel property, farm land and woodland: an attractive pond is a feature. The highest section commands a view of Baltimore City. The club house proposed for the course will be constructed on very simple lines and will include only locker rooms, a shop for the professional, and a small lounge.

WILLOW WATER GARDENS

This is another unique feature of the Park. Its purpose is to provide a canoeing center between the River

and Hammonds Ferry Road. The land at the present time is partially swampy and much of it is a depleted area of the Arundel Corporation's sand and gravel operation. This was once the site of a thriving willow industry, and there are many willows now growing in the area. It is proposed to develop a system of meandering canals having an average width of 20 feet. The banks of the canals will be planted with various types of willows creating the effect of Willow Water Gardens. It will be comparable to the Cypress Gardens in South Carolina. Along the banks of the canals is a series of picnic sites for canoeists. The canals have a direct connection with the River so that canoeing is not restricted entirely to the area.

A building especially designed as a canoeing center is located near the River and the Hammonds Ferry Road. It is provided with storage space for 60 canoes, dock, office, snack bar, and an outdoor terrace for spectators. On the other side of the road adjacent to the River is a large area provided for the parking of cars.

"THE WHEEL" RECREATION CENTER

This unique feature comprises a group of popular activity centers arranged in the form of a wheel. The area of the wheel comprises about 80 acres, but 100 acres have been designated for the purpose. The access is from Route 170.

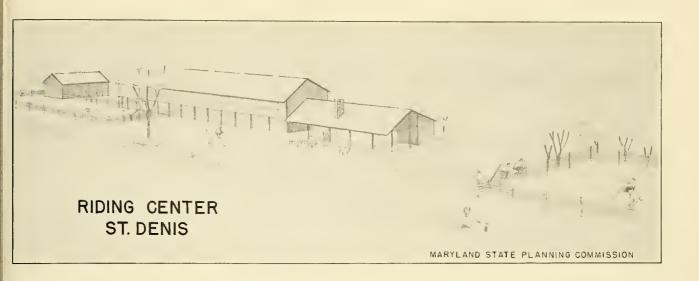
The Plan provides that patrons may park their cars immediately adjacent to the facility in which they have the greatest interest. At the same time if they wish to engage in several activities, the walking distance is not great.

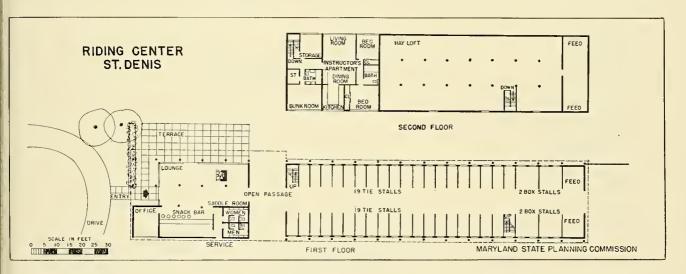
Also readily accessible to all facilities is the control building with its snack bar, lounge, toilets, office, and supplies.

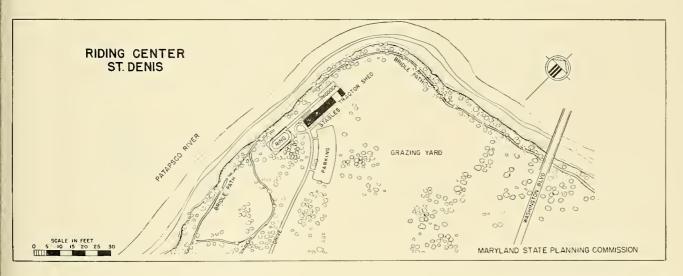
All the facilities indicated will carry a fee with the exception of the parking area. It is proposed that children's areas, swimming pool, and parking areas be administered directly by the park authorities, while the other facilities be let out as concessions.

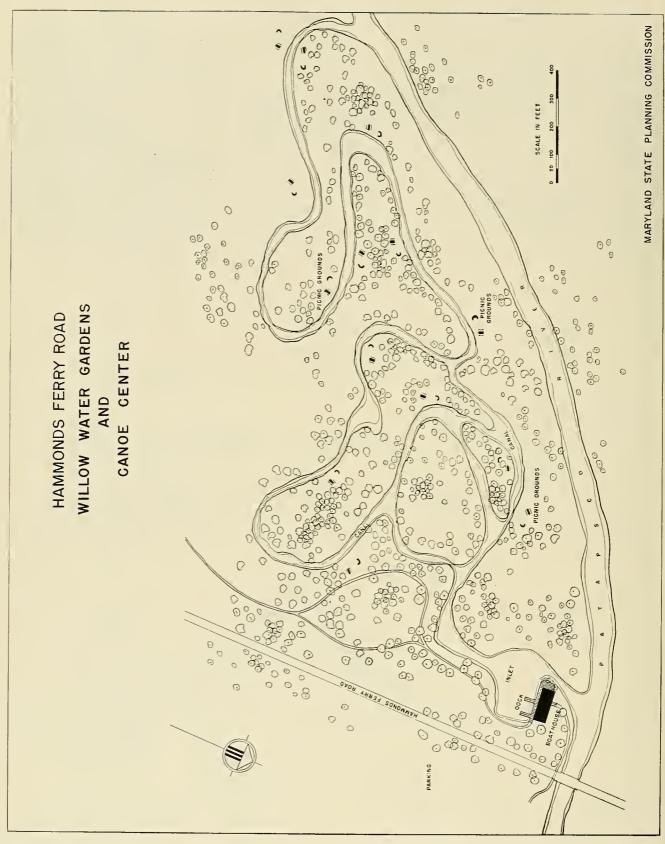
While this is bound to be one of the most popular features of the Park, it must be low on the priority list because the location proposed for it is Arundel Corporation property which will be available only in the later stages of development of the Park.

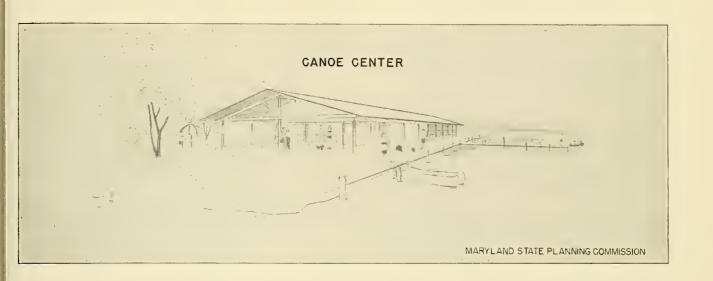


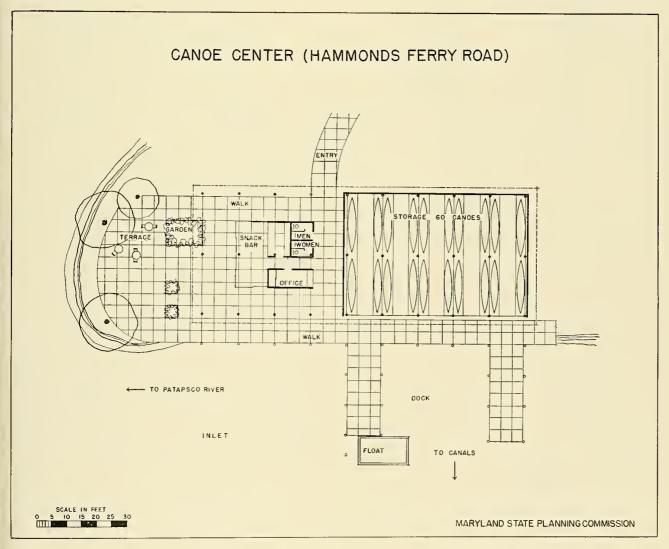


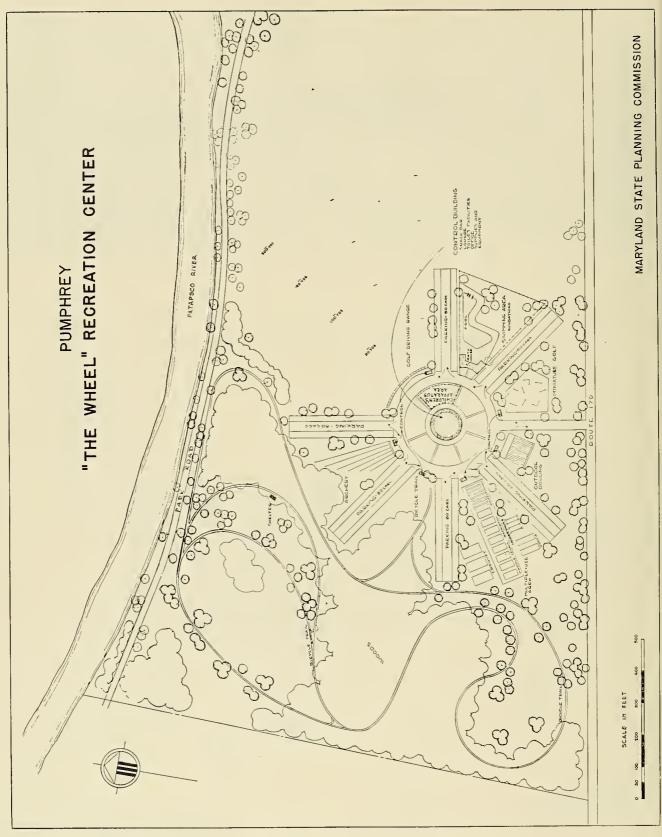












5. ESTIMATED COSTS FOR ACQUISITION, CONSTRUCTION AND DEVELOPMENT

To a great extent, the land included in the proposed acquisition is currently not of very great value. Much of it consists of wooded slopes along the River and its tributaries, which would be difficult to develop for residential or commercial uses. There is considerable low land, including swamps. In the Lower Valley, the depleted gravel and sand acreage, which is already extensive, should be obtainable at nominal prices. There is not much heavy saw-timber.

Wherever possible the park lines have been drawn so as to avoid acquiring improvements.

In the case of proposed park land owned by the State and under the jurisdiction of departments other than the Department of State Forests and Parks, it is suggested that such land be transferred to the latter agency, if not required for other purposes.

As shown in Table 1, the average estimated value per acre of the land to be acquired is \$67. With the improvements on the land, the estimate averages \$105 per acre.

It is to be hoped that much land will be donated or obtainable with donated funds.

TABLE 1
SUMMARY OF ACREAGE AND ESTIMATED COST OF LAND AND IMPROVEMENTS TO BE ACQUIRED

Area	Acreage	Land	Improvements	Totals
Lower Valley				
Baltimore County	887.1	\$107,308	\$ 24,500	\$131,808
Anne Arundel County	972.5	121,682*	71,750*	193,432
Howard County	111.5	15,000		15,000
	1971.1	\$243,990	\$ 96,250	\$340,240
Upper Valley				
Carroll County	1067.0	\$ 53,553	\$ 39,000	\$ 92,553
Baltimore County	1798.8	75,919	51,500	127,419
Howard County	2134.1	114,712	58,000	172,712
	4999.9	\$244,184	\$148,500	\$392,684
ENTIRE VALLEY	6971.0	\$488,174	\$244,750	\$732,924

^{*}Division of costs between land and improvements is approximate.

The figures do not include the Liberty Reservoir and the property of the City of Baltimore in the Lower Patapsco Valley. They also omit the cost of the small acreages incorporated in the Development Plan but owned by the State Roads Commission adjacent to the Baltimore-Washington Expressway near Lansdowne and west of Patapsco Village. The additions adjacent to the present park are included.

Allowing a margin of \$67,076, the sum of \$800,000, or \$115 per acre, may be taken as necessary to purchase the proposed property additions.

As outlined in Table 2, the total estimated expenditure for construction and development of the Park will amount to \$5,901,148 for the twelve-year period. Of this total, \$625,000 is for improvement of 25 miles of existing roads within the proposed park boundaries. Hence, \$5,276,148, is the amount required for the development.

The grand total of the cost of land acquisition, development and construction is \$6,701,148.

TABLE 2
ESTIMATED ANNUAL EXPENDITURES FOR CONSTRUCTION AND DEVELOPMENT

Year	Estimated Expenditures
1st	\$ 470,500
2nd	520,525
3rd	487,875
4th	504,339
5th	518,750
6th	471,914
7th	497,830
8th	527,905
9th	533,830
10th	521,355
11th	497,965
12th	348,360
4-111	
TOTAL EXPENDI	TURE \$5,901,148
AVERAGE ANNU.	AL EXPENDITURES S 491,762

Omitted in the figures are several items such as the riding center at Elkridge, the skeet center, children's rides at Lansdowne, and several features at "The Wheel." It is intended that these be provided by private interests or concessionaires at their own expense. In the case of developments proposed for areas in which the Arundel Corporation or other companies

are in active operation, both acquisition and development must be postponed until the land becomes available.

A breakdown of the annual schedule, by special projects, is given in Table 3.

The difference between the total shown in Table 3 and the estimated total cost of development and construction is \$1,886,237, which represents general development costs for roads, picnic centers, bridle trails, paths, and other usual facilities.

TABLE 3

ESTIMATED CONSTRUCTION AND DEVELOPMENT COST
OF SPECIAL UNITS

	OF SPECIAL UNITS	
Years Sched	uled Unit	Costs
6th-12th	Lagoon Park (mud flats)	\$1,518,777
1st -10th	Recreation Center, Lansdowne	
1st - 3rd	Avalon Pool and Dam	110,000
lst	Youth Camp off U. S. 40	135,000
1st - 8th	Family and Organization Camp off U. S	
	40	433,000
3rd - 8th	Marriottsville Center	338,050
2nd- 8th	Henryton Center	97,750
3rd -12th	Howe Estate	
3rd	Youth Camp, South Branch	10,000
2nd-4th	Ellicott City Center	82,725
2nd	Bloede Dam	25,000
3rd - 6th	Recreation Center, Deep Run	. 83,725
	Riding Center	
7th-10th	Golf Course	
4th-6th	Willow Water Gardens	
11th-12th	"The Wheel"	216,720
Тота	L	\$4,014,911

^{*\$53,000,} to be privately financed.

6. PRIORITY SCHEDULE OF LAND ACQUISITION AND DEVELOPMENT

The proposed priority schedule which follows is based on several factors, including the desirability of acquiring land at present prices and while it is available for park purposes, the character of the proposed development with reference to the number of persons to be served, and the principle of distribution of benefits throughout the Valley. On the ground that the most immediate need is to acquire the necessary land, the acquisition of the recommended land with the improvements on it is confined to a period of four years. This means an annual expenditure for acquisi-

tion of \$187,500 to \$200,000 for the four-year period unless a substantial acreage is donated or purchased at much less than current prices. The schedule for construction and development is dependent upon factors similar to those affecting acquisition, including anticipated delays in securing land now being mined for sand and gravel and not available for some years. In the case of the Lagoon Park in the mud flats area, no development will be feasible for several years, awaiting the accumulation of fill.

First Year

Acquisition

Picnic and day camp area, Brooklyn Heights.

Lansdowne recreation center

Family and youth camps, north and south of U. S. 40

Regional recreation center, Marriottsville

Development

Avalon pool, bath house, parking and observation

deck at Dam

Park roads, Glenartney section

Lansdowne recreation center

Picnic and day camp areas, Brooklyn Heights

Family camp and youth camp, U. S. 40

Day camp, Oella

Second Year

Acquisition

Thistle Road Land from U. S. 301 to Baltimore-Washington Ex-

pressway

Recreation center, Ellicott City

Lagoon park (mud flats area) Golf course property

Land for scenic outlook and picnicking above Alberton

Picnic area, English Consul

Private commercial properties, existing park

Parking areas for existing park

Playfield, Relay

Deep Run, both sides

Development

Recreation center, Ellicott City; roads, picnic area,

parking for scenic view

Bloede Dam

Day playfield and 2 picnic centers, existing park

Lansdowne recreation center

Family camping area near U. S. 40: swimming pool,

I dormitory, mess hall, recreation hall, 5 cabins

Henryton recreation center: swimming pool

Third Year

Acquisition

Stoney Run forest park

Depleted sand and gravel area east of Pennsylvania

Railroad, Anne Arundel County

Arundel Corporation property east of area above, not

to be mined

Piney Run Valley Brice Run Valley

Willow Water Gardens area

Riding center, Relay

Old Howe Estate and camping area, South Branch

Scenic valley and Camel's Den Cave, Upper Patapsco

Development

Remodel old Howe Home; parking area

Youth camp, South Branch

Ten cabins on Howe Estate

Recreation center, Deep Run near Elkridge

Picnic center near mouth, Deep Run

Picnic center, day camp, parking and roads, existing

park, Howard County side

Avalon development, existing park

Road from lagoon park to Lansdowne recreation center

Marriottsville swimming pool

Fourth Year

Acquisition

Farm and river meadows above Woodstock, Howard County

Pindel property, existing park

Wooded swamp area, west of Baltimore & Ohio yards, Baltimore County

Playfield, Monumental

Riding center, Howard County Forest park, Carroll County

Forest park above Alberton, Baltimore County

Forest park, north of Alberton

Alberton scenic drive

Playfield below Woodstock, Howard County

Forestation area below Marriottsville

Skeet area north of Alberton, Howard County

Miscellaneous remaining forest park and forestation

Development

Forest park and special picnic areas from Ilchester to Woodstock, Baltimore County

25 miles of bridle paths and 20 miles of hiking trails

Recreation center, Lansdowne

Road, Pennsylvania Railroad to Baltimore & Ohio Railroad at Relay, Baltimore County

Playfield at Relay

Picnic area, day camp, trail-side zoo, parking, and forest park, between U.S. 40 and Ellicott City

Recreation center, Ellicott City

Road, parking, and picnic area between Alberton and U. S. 40, Howard County

Forest park, Anne Arundel County between Pennsylvania Railroad and Route 167

Willow Water Gardens

Fifth Year

Development

Recreation Center, Marriottsville

Roads, playfield, forest park Howard County side, Woodstock to Baltimore and Ohio Bridge

Improvement of existing roads

Road from Brooklyn to U. S. 301, Lower Patapsco

Sixth Year

Development

Recreation center, Elkridge

New dam, playfield, and picnic center, South Branch

Lagoon park

Willow Water Gardens

Seventh Year

Development

Lagoon park

Recreation center, Lansdowne

Road, cliff-side walk, and picnic center, Raynor

Heights

Golf course

Roads, Ellicott City to St. Mary's College, and forest

Forest park, South Branch and county bridge to Mar-

riottsville

Eighth Year

Development

Recreation center, Marriottsville Recreation center, Lansdowne

Recreation center, Lansdowne

Bridge, picnic center, Henryton playfield

20 cabins, family camp area, near U. S. 40

Lagoon park

Lagoon park "The Wheel"

"The Wheel"

Ten cabins, Howe Estate

Five cabins, family camp near U. S. 40

25 miles of bridle paths and 20 miles of hiking trails

Improvement of 6.25 miles of existing roads

Ninth Year

Development

Golf course

Lagoon park

Tenth Year

Development

Lagoon park 25 miles of bridle paths and 20 miles of hiking trails

Improvement of existing roads

Golf course

Lansdowne recreation center

Eleventh Year

Development

Improvement of existing roads

Twelfth Year

Development

Roads, Baltimore & Ohio Bridge to Alberton; picnic

area

44

7. ADMINISTRATION

The launching of even a portion of the Development Plan for the Patapsco River Valley Park will require the immediate adoption of an enlarged concept of the role of state parks in Maryland. An expansion of services, increase of personnel, greater maintenance and operating funds, and a vigorous educational and promotional program are called for. At the present time, the State unfortunately is giving the existing Patapsco State Park only a minimum development and program.

With the acquisition of land and the addition of facilities, the park staff must gradually be expanded. A superintendent and ultimately two assistant superintendents will be required. Of the assistants, one preferably should be especially versed in the administration of urban-type centers and the other in the problems of informal uses of the park. The early employment of a naturalist is also urged. When fully developed, the Park will probably require 16 year-round employees and 21 seasonal workers, not including personnel, largely seasonal, at the 15 special units.

Obviously, the responsibilities of the personnel will carry far beyond the care of forests and fire preven-

tion and control. The introduction of intensively developed recreation centers, modern swimming pools, large parking areas, fields for sport and heavily used park structures, not to mention camp and large picnic centers, calls for high skill in the management of property and the rendering of effective recreation service to the public. Human use of the Park, which is the first consideration, can be successfully coordinated with a planned conservation program.

Early employment of a well-trained superintendent for the Park is urged. He should be primarily an executive and promoter, well versed in public relations and able to interpret the importance and needs of the Park to private citizens, business groups, and civic organizations. Also important is the superintendent's ability to promote a public awareness of the riches of the Park and to extend available facilities to the widest recreational use possible.

As the Park is used more intensively, problems of control will increase. Hence special police will be required, in addition to the foresters and other field employees who have the power of constables.

8. OPERATING AND MAINTENANCE COSTS AND REVENUES

The estimates for maintaining the Park and obtaining revenues from facilities are intelligible only as the dual nature of the proposed development is understood. The Patapsco River Valley Park will have the characteristic features of most state parks plus several intensively developed areas indistinguishable from city parks. The urban-type areas, such as Lansdowne, Ellicott City, and Lagoon Park, are expensive to develop and operate and their acreage costs are high. City parks are nowhere expected to make money. Among all state parks in the country revenues total not more than one third of the operating costs.* Indiana charges admission to its parks as well as for parking. It does a big hotel and concession business and manages to make its parks more than self-supporting.

In the Patapsco Plan, a conservative policy has been followed. No admissions to the Park are proposed. Parking charges are recommended only at the future lagoon development. No charges are suggested for picnicking. Reasonable charges have been applied to cabin rentals, camp dormitories, exclusive use of group camps and for boating, canoeing, golf, swimming, and other activities which the public is accustomed to pay for. If the golf course cannot be made at least self-maintaining, it should not be built.

To produce income, not too expensive to collect, at several centers, soft drink vending machines, snack bars, and a number of popular concessions have been introduced.

The estimates given in Table 4 are based on calculation of personnel required, expenses, probable attendance, buying habits of the public, reasonable charges, and an analysis of the experience in parks in

*State Parks, 1948, National Park Service, June 1949.

other states. The costs and revenues shown are for the Park in its completed state some years hence.

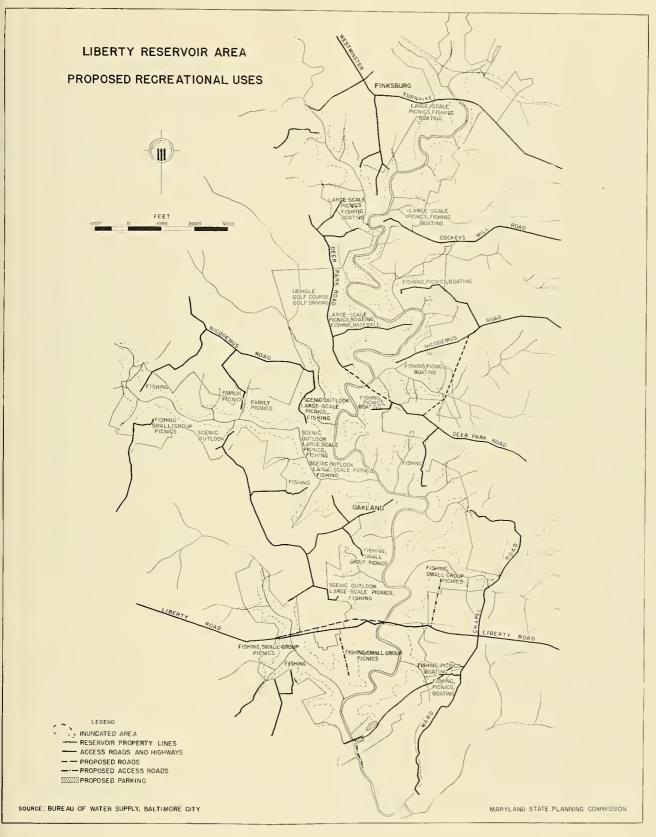
The cost figures for the individual units are over and above the estimates for the Park in general. Some of the direct expenses of maintaining these units will be borne by the general labor force.

TABLE 4
ESTIMATED ANNUAL OPERATING AND MAINTENANCE AFTER
COMPLETION OF PARK

Unit	Cost	Revenue
Park, General	\$ 97,050	\$ 12,375
Lansdowne	27,340	19,850
Ellicott City	7,500	1,000
Marriottsville	14,000	13,500
Elkridge	7,000	4.000
Golf Course	34,000	36,000
Old Howe Estate	10,000	13,000
Willow Water Gardens	5,080	7,400
Avalon	4,040	5,000
Bloede	2,000	3,700
Henryton	12,000	9,000
Youth Camp, U. S. 40	3,500	5,000
Family Camp, U. S. 40	8,000	18,400
"The Wheel"		35,700
Lagoon Park	45,388	52,750
Total	\$297,498	\$236,675

Thus, at the stage of full development, the net annual cost of operating and maintaining the park would be \$60,823.

It should be noted that the detailed study on which these estimates are based is on file at the Maryland State Planning Commission and may be examined at any time. Appendix B summarizes the figures for estimated attendance, operating and maintenance costs, and revenue for Lagoon Park, which is the largest single project proposed in the Development Plan.



9. RECREATIONAL USE OF LIBERTY RESERVOIR AREA

The recreational use of metroplitan reservoir watersheds is extensive. The most common uses are for scenic drives and parkways, fishing, boating, picnicking, hiking, horseback riding, nature study, and the conservation of wildlife. Wading, bathing, and hunting are generally prohibited, for reasons of public psychology and safety rather than the prevention of pollution.

It is axiomatic that regardless of whoever administers the recreation program, the Water Bureau must have control of the scope of activities, inspect all sanitary facilities, and inspect and approve all construction.

A Great Potential Recreation Asset

With full protection to its function as a source of water supply, the Liberty Reservoir may serve in an outstanding way as a recreation area. The watershed acquired by the City contains a combination of accessible farm fields and excellent forests which lend themselves to varied recreation activities. There are many locations offering splendid views of the water and surrounding lands because of high elevations. Numerous minor roads will be dead-ended because of inundation, but they could in some locations be sufficiently well maintained to provide access to fishermen and picnickers.

Until the Patapsco and other streams are freed of pollution and perhaps even after that is accomplished, the City's reservoirs will be a better resource for fishing than streams.

The character of the area also makes it most suitable and attractive for picnicking, hiking, horseback riding, and other forms of recreation, as well as a wildlife refuge.

The recreational opportunity at the reservoir site is enhanced by its nearness to the area proposed for the Patapsco River Valley Park. The two areas can be coordinated.

Precedents for these recommendations exist already in Baltimore. At Loch Raven Reservoir, fishing from boats and picknicking in limited locations are permitted. The Prettyboy area is a wildlife preserve under the jurisdiction of the State Game and Inland Fish Commission. Here, fishing from the shore is permitted.

Sound Basis For A Policy

In view of the wide and successful experience in developing recreation uses in reservoir areas, the question of pollution and public safety is not the primary question confronting the City. The natural conservatism toward recreation of some reservoir authorities has been due principally to the fact that their function is not one of recreation service and their staff and appropriations have not been geared to recreation development and operation.

Hence, it is important at the outset, first, to assume a positive policy favorable to recreation and, second, to decide whether development and promotion shall be the concern of an agency whose business is park and recreation service or whether a special bureau adequately trained and staffed shall be created within the water department. Park and recreation agencies assume the necessity of an adequate maintenance and policing staff for the care of a decentralized and scattered system of facilities. In Los Angeles, the Recreation and Park Department has responsibility for recreation on watersheds as well as in the parks and other areas. It seems most logical and essential to plan now to develop as many centers for recreation as the area will permit and for the City to assume the consequent responsibilities of maintenance, operation, and policing.

As a matter of effective control as well as recreation service, it seems best to designate, maintain, and administer the most desirable locations for recreation rather than to prevent the public from making its own selections because of the lack of areas officially provided.

Recommended Recreation Areas

As shown on the map of proposed recreational uses, the types of activity centers range from simple fishing locations to large-scale picnicking, boating, fishing, and sports areas, and a golf course. The golf course could be developed on a very large area which was formerly farmed.

The development of sites will naturally be a longrange process. The locations recommended are shown in detail on an area purchase map of the Bureau of Water Supply on file in the office of the Maryland State Planning Commission. On this map, the sites are identified with numbered properties within reservoir land.

Swimming

When it is considered that Chicago, Detroit, and other cities draw their water supply from adjacent lakes and rivers in which there are bathing, boating, and other recreations, fear of pollution from swimming appears baseless. An educational program to prepare the public for eventual swimming in Liberty

Reservoir is recommended. Baltimore may well take the lead in this pioneer movement.

Protection from Adjacent Undesirable Uses

For the protection of the reservoir area from undesirable commercial or other uses on Liberty Avenue and other highways, zoning restrictions should be applied. If this is not feasible, additional acreage should be acquired for park or buffer purposes, wherever the area taken by the Bureau of Water Supply is close to the eventual line of inundation.

APPENDIX A

EXPLANATION OF TERMS

Bird Sanctuary

This preserve for birds is intended to contain no development except trails and parking areas near the entrances.

Day Camp

A camp area for children who come from and return to their homes daily. There are no sleeping accommodations. The facilities include toilets, fireplaces, a council ring, and a simple shelter building. The location is always a good one for the purpose of nature study.

Forestation Area

Either an open or wooded area requiring a program of forestation.

Forest Park

Primarily a forest in which hiking, horseback riding, picnicking and nature study are the only recreation activities permitted. There are no automobile roads except service roads and access roads. Scientific lumbering is appropriate.

Meadow

A natural or graded meadow in grass to be utilized for games and informal recreation. No construction.

Nature Study Area

An area rich in plant and animal life designated for observation and study by individual groups with or without the guidance of naturalists. There are no facilities and all animals, reptiles, insects, plants, and minerals are to be observed in their natural state.

Picnic Center

- A. For 100 to 500 persons: recreation field, large shelter building equipped with toilets, fire-places, floor for games and dancing, and water supply. Ample parking.
- B. For 20 to 100 persons: softball diamond, horseshoe courts, toilets, fireplaces, and spring or other water supply.
- C. Scattered family or very small group centers, with or without fireplaces and with or without immediate water supply. Toilet facilities are in the general area.

Playfield

- A. A large and generally level area for sports and recreation, intended primarily for young people 16 years and over and adults: baseball, softball, touch football, soccer, court games and picnic area. Bleachers, shelter building with toilets, storage space, and office.
 - B. Space for baseball, softball, and archery. No stands.

Recreation Center

A park area for numerous varied activities, ranging from rest in a secluded spot to strenuous sports and swimming. It is located adjacent to an urban center or centrally in a region.

Riding Center

Area and structures to facilitate horseback riding. Stables, exercise and instruction areas, and parking space are included.

Scenic Drive

An automobile road through attractive stream valley, along river, through woods and other scenic places.

Scenic Outlook

A location on an elevation commanding an attractive view in one or more directions, usually with near-by access by automobile.

Swimming Center

A pond or modern chlorinated pool with bathhouses and a parking area.

APPENDIX B

SUMMARY OF ESTIMATED ATTENDANCE, OPERATING AND MAINTENANCE COSTS, AND REVENUES FOR LAGOON

Attendance

The following estimates are based on a maximum of six months' operation per year with some activities for three months. Motorists driving through the area are not included.

•	0	200,000 150,000
		 350,000

Operating and Maintenance Costs

The figures given are the estimated costs over and above those for the Park as a whole. The estimates cover personnel and other expense for the facilities and the services involved in the athletic, boating, bicycling, dancing, and other program activities.

Year-round and seasonal personnel	\$25,380
Supplies and equipment	20,000
	Total \$45,380

Revenues

In the calculations of revenue it is assumed that the Park Department will operate directly all the facilities bearing charges and fees, with the exception of the food concessions. Estimates are based on attendance and on fees fixed at rates at or less than commercial levels in Greater Baltimore. In this area a parking charge is included.

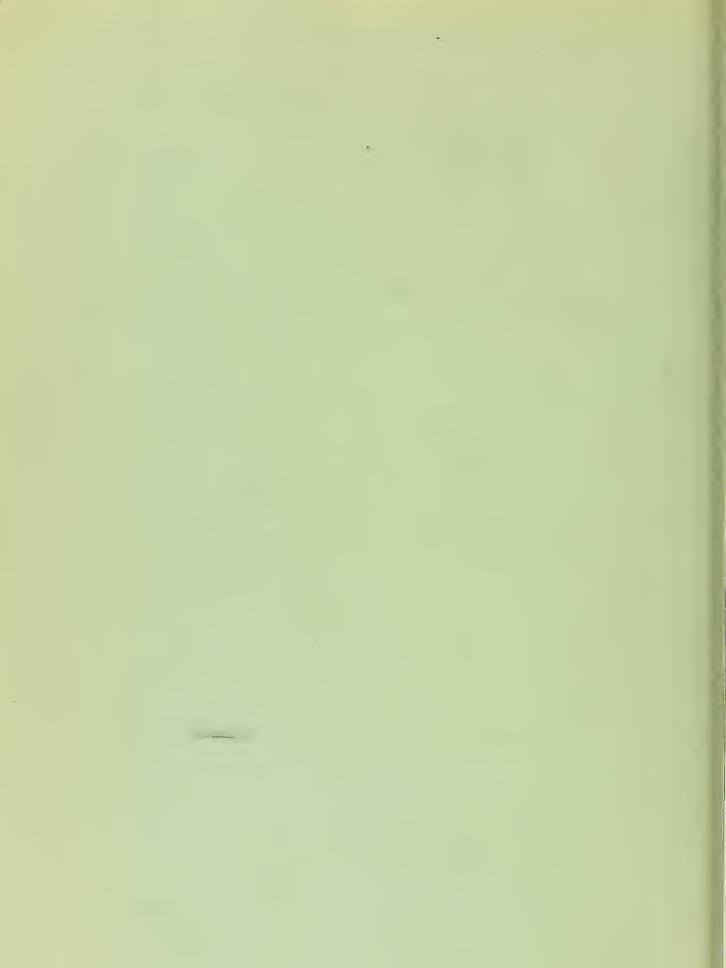
Parking fees	\$18,750
Boathouse operations	
Membership fees	5,000
Rentals	5,000
Bicycle operations	
Rentals	5,000
Use of paths by bicycle owners	500
Court games	7,500
Miscellaneous rentals and fees	5,000
Net income on food concessions	6,000
Total	\$52,750

Note

Free activities in the area include archery, use of area for model airplanes, horseshoe pitch ing, picnicking, listening to band concerts and attending athletic contests.

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